

## REMARKS/ARGUMENTS

Claims 1-22 were previously pending in the application. Claims 1 and 11 are amended; and new claims 23-25 are added herein. Assuming the entry of this amendment, claims 1-25 are now pending in the application. The Applicant hereby requests further examination and reconsideration of the application in view of the foregoing amendments and these remarks.

On page 2 of the office action, the Examiner rejected claims 1-3, 6, and 11-13 under 35 U.S.C. 102(b) as being anticipated by Hans. On page 2, the Examiner also rejected claims 1-4, 8, and 11-14 under 35 U.S.C. 102(e) as being anticipated by Kim. On page 3, the Examiner objected to claims 5, 7, and 9-10 as being dependent upon a rejected base claim, but indicated that those claims would be allowable if rewritten in independent form. On page 3, the Examiner also allowed claims 15-22. For the following reasons, the Applicant submits that all of the now-pending claims are allowable over the cited references.

Claim 1 has been amended to clarify that the first portion of the first transfer function corresponds to a first voltage range of the input signal, and the second portion of the first transfer function corresponds to a second voltage range of the input signal different from the first voltage range of the input signal. Support for these amendments is found, for example, in Fig. 3.

According to the Examiner, both Hans and Kim teach methods in which (1) a first signal is generated corresponding to a first portion of a first transfer function and (2) a second signal is generated corresponding to a second portion of the first transfer function. The Applicant submits, however, that neither Hans nor Kim teaches or even suggests that the first portion of the first transfer function corresponds to a first voltage range of the input signal, and the second portion of the first transfer function corresponds to a second voltage range of the input signal different from the first voltage range of the input signal.

For all these reasons, the Applicant submits that claim 1 is allowable over the cited references. For similar reasons, the Applicant submits that claim 11 is allowable over the cited references. Since claims 2-10 and 12-14 depend variously from claims 1 and 11, it is further submitted that those claims are also allowable over the cited references. The Applicant submits therefore that the rejections of claims under Sections 102(b) and 102(e) have been overcome.

New claim 23 is equivalent to previously pending claim 7 rewritten in independent form. Since the Examiner stated that previously pending claim 7 would be allowable if rewritten in independent form, the Applicant submits that new claim 23 is allowable.

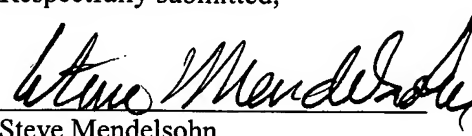
New claim 24 is equivalent to previously pending claim 9 rewritten in independent form. Since the Examiner stated that previously pending claim 9 would be allowable if rewritten in independent form, the Applicant submits that new claim 24 is allowable.

New claim 25 is equivalent to previously pending claim 10 rewritten in independent form. Since the Examiner stated that previously pending claim 10 would be allowable if rewritten in independent form, the Applicant submits that new claim 25 is allowable.

In view of the above amendments and remarks, the Applicant believes that the now-pending claims are in condition for allowance. Therefore, the Applicant believes that the entire application is now in condition for allowance, and early and favorable action is respectfully solicited.

Respectfully submitted,

Date: 2/11/05  
Customer No. 22186  
Mendelsohn & Associates, P.C.  
1515 Market Street, Suite 715  
Philadelphia, Pennsylvania 19102

  
Steve Mendelsohn  
Registration No. 35,951  
Attorney for Applicant  
(215) 557-6657 (phone)  
(215) 557-8477 (fax)